

pared from diverse materials. Probably no species exists with the combination of characteristics as depicted. In view of this situation, despite Fernald's claim that Catesby's plate is a beautiful match for *S. hispida* var. *australis*, a definite identification of this plate or accompanying description seems impossible. Catesby's *Smilax bryoniae nigrae foliis, caule spinoso, baccis nigris* is not capable of precise interpretation. If that is a primary basis for *S. tamnoides* L., as seems probable, then Linnaeus' name should be regarded as ambiguous. It should be deleted from further consideration. This conclusion enables us to continue to employ *S. hispida* Muhl. (Torrey, Fl. N. Y. 2: 302. 1843), probably based on plants both from Pennsylvania and New York, and clearly described as with the stems hispid and with the supplementary notes by Torrey that the prickles are slender and the fertile flowers about six in an umbel.

The Bristly Greenbriers of the Coastal Plain of the southeastern states, from Virginia to Texas, appear to differ from the northern and upland plants in their pandurate leaves of somewhat firmer texture. These have been named *S. hispida* var. *australis* Norton in Small. In accordance with the recent action of the International Botanical Congress regarding nomenclaturally typical subspecies and varieties (See Science 112: 444. 1950), the variety with ovate leaves should now be designated as *S. hispida* var. *hispida*.

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FOUR PLANTS NEW TO THE ILLINOIS FLORA.—During my field work in 1950, I found three species which are apparently new to the Illinois flora. A high school teacher called my attention to a fourth species.

SPECULARIA BIFLORA (R. & S.) Fisch. & Mey.—Palmer and Steyermark¹ reported this species from 16 counties in southern Missouri. Fernald² reported its occurrence as far north as southern Kentucky and Missouri in the Mississippi valley but did not include Illinois. I found this plant in three sites, two in

¹ Ann. Mo. Bot. Gard. 22: 375-746. 1935.

² Gray's Manual of Botany, ed. 8. 1950.

Pulaski County, and the third in Johnson County, Illinois. Specimens in the herbarium of the Illinois State Natural History Survey are from the following localities.

JOHNSON Co.: Field, Borax Cave, west of Goreville, June 11, 1950, *R. A. Evers 23744*. PULASKI Co.: Waste place, Lock and Dam No. 53, east of Olmsted, June 10, 1950, *R. A. Evers 23574*; in a field, 1 mile north of Lock and Dam No. 53, east of Olmsted, June 10, 1950, *R. A. Evers 23582*.

RUDBECKIA MISSOURIENSIS Engelm.—While observing the flora of the rock and loess hill prairies on the bluffs of the Mississippi River, I first noticed a coneflower that did not have the aspect of the common Black-eyed Susan. Upon examination I found that the pales were not bristle-tipped and bristly-ciliate as in the Black-eyed Susan. I determined this coneflower as *Rudbeckia missouriensis* Engelm., took samples to the Missouri Botanical Garden, and in comparing found them to be conspecific with specimens of *Rudbeckia missouriensis* collected by J. A. Steyermark and others. Palmer and Steyermark (l. c.) reported this plant from "Southern and central Mo. south and east of a line drawn from St. Charles, Montgomery, Boone, Morgan, Hickory and Polk counties to Benton Co." Its occurrence in southwestern Illinois could very well be expected. I have collected specimens from the following localities.

MONROE Co.: Hill prairie south of Valmeyer, September 2, 1949, *R. A. Evers 20485*; July 9, 1950, *R. A. Evers 25180*; August 30, 1950, *R. A. Evers 27170*; hill prairie southeast of Fults, August 30, 1950, *R. A. Evers 27100*; rock prairie southeast of Fults, August 30, 1950, *R. A. Evers 27054*. RANDOLPH Co.: Hill prairie above Columbia Quarry, north of Prairie du Rocher, July 29, 1950, *R. A. Evers 25648*; September 19, 1950, *R. A. Evers 27538, 27566*; hill prairie north of Columbia Quarry, north of Prairie du Rocher, September 19, 1950, *R. A. Evers 27595B*.

HELIOTROPIUM TENELLUM Michx.—This "delicate" heliotrope grows in eastern, central and southern Missouri according to Palmer and Steyermark. I found it growing on a rock ledge on the bluffs of the Mississippi River southeast of the village of Fults in Monroe County, Illinois. I have not found it in similar situations elsewhere in Monroe County nor in Randolph County to the south. Further search along the limestone ledges in southwestern Illinois may disclose a more extended range.

MONROE Co.: Rock ledge southeast of Fults, August 30, 1950, *R. A. Evers 27049*.

ERIOCHLOA VILLOSA (Thunb.) Kunth.—Mr. J. V. Myers, instructor in agriculture, Odell, Livingston County, Illinois, brought me a grass sample for identification. He later took me to corn and soybean fields near Odell where this grass was quite abundant and we collected samples. Dr. J. R. Swallen of the United States National Museum determined them as *Eriochloa villosa* (Thunb.) Kunth, the Hairy Cup-grass. In his communication, Dr. Swallen stated that this grass has been previously found on ballast in Portland, Oregon, and in El Paso County, Colorado. Its occurrence in Livingston County, Illinois, adds another Asiatic grass to the Illinois flora. In the fields near Odell, the Hairy Cup-grass apparently was more successful than *Setaria faberii* which was also present. It will be interesting to see whether or not it will spread and become a pest as has *Setaria faberii*.

LIVINGSTON Co.: In a cornfield, 3 miles east of Odell, August 25, 1950, R. A. Evers & J. V. Myers 26812, 26813.

—ROBERT A. EVERS, Illinois State Natural History Survey, Urbana.

A QUICKER MORE SATISFACTORY METHOD FOR SOAKING AND RE-PRESSING DRIED PLANT SPECIMENS.—Poorly pressed plant specimens may be saved for mounting on herbarium sheets by an extension of the method of Fassett.¹ The specimens to be soaked are placed separately between metal corrugates as used in drying fresh plants and submerged in a very dilute solution (about 1 tablespoon per gallon water) of any household detergent such as "Dreft," "Vel," or "Tide." The stack of material should be weighted down to prevent the floating of particles or intermingling of different specimens. The specimens should be completely covered by the solution and allowed to soak for about twenty minutes for ordinary herbaceous species and thirty to thirty-five for tough woody and succulent species.

When soaking a number of plants together a simple numbering procedure, wherein corresponding numbers are placed between the corrugates and in the sheets from which the plants were

¹ Fassett, N. C., "Herbarium Technique," *Rhodora* 51: 59, 60. Mr. 1949.